

Solar San Diego: Clean Energy Market Development

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Partner with City of San Diego: California Center for Sustainable Energy

Our Vision:

Creating a sustainable energy future

Our Mission:

To foster public policies and provide programs, services, information and forums that facilitate the adoption of clean, reliable, renewable, sustainable and efficient energy technologies and practices



About CCSE

- Independent Non- Profit 501 (c)(3)
- Founded in 1996 to implement SANDAG's regional energy plan
- Funded through state & federal public-interest energy programs
- Growing fee-based practice
- Experienced Board and staff
- Emphasis on serving the region

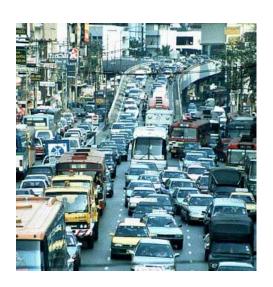




Areas of Focus

- Energy Efficiency
- Green Building
- Renewables
- Climate Change
- Transportation









Annual Events





- Solar Energy Week
- Street Smart San Diego
- San Diego Excellence in Energy (SANDEE) Awards
- Be an Energy All Star





CCSE Programs

- San Diego Energy Resource Center (ERC)
- Tax-Exempt Customer Incentive Program
- Cool Communities Shade Tree Program
- Self-Generation Incentive Program
- California Solar Initiative
- Solar Water Heating Pilot Program
- Fueling Alternatives
- Rebuild San Diego



Self-Generation Incentive Program

- CCSE has administered SGIP in SDG&E territory since 2001
 - Total of 32+ MW incented (~9MW solar); \$66M total incentives paid
 - Currently covers Wind and Fuel Cells
- Strengths include our excellent <u>customer service</u>





California Solar Initiative

- CCSE is one of three Program Administrators (PAs), together with PG&E and SCE
- CCSE contributes to program development at a level far above its portion of program budget

 ED staff relies on CCSE for our solar industry expertise, flexibility and responsiveness





Solar Water Heating Program

- San Diego only: CPUC explicitly asked CCSE to develop and implement
- Incentive budget of ~\$1.6M over 2 years
- Lessons from the SWH Program will inform AB1470 implementation (200,000 systems)
- Well-designed, groundbreaking program for California
- Market Transformation (MT) for a sector with huge carbon reduction potential, but in need of professionalization
- Program may be going statewide for its final year....



Color Your World Green.

The California Center for Sustainable Energy is here to help you go green by providing cash incentives designed to make going solar affordable. Generate your electricity at home using solar photovoltaics. Visit www.gosolar.energycenter.org or call (866)-SDENERGY to get started today!

Direct Mail



Strategic **Print** Exposure

solar calculators? They're great aren't they? There's no electrical cord to plug in or batteries to buy. You just put them in the light and they work. Wouldn't it be nice if everything worked that way? In your home practically everything can. Solar energy systems are a well-developed technology that homeowners can no longer afford to overlook.

There are three main types of solar applications for the home. Photovoltaics (PV) is a solar power technology that uses solar cells to convert sunlight into electricity that can be used around your home. When sunlight strikes these solar cells, they release small amounts of electricity, giving off what is known as the "photovoltaic effect."

Dollars

& Sense

Going

tems that convert the sun's energy to heat that can be used to heatwater, which offsets loads typically carried by natural gas and electricity.

Two programs, the California Solar Initiative and the Solar Water Heating Pilot Program, really bring solar technology home. The California Solar Initiative is part of Governor Arnold Schwarzenegger's \$3.35 billion effort to bring solar energy into the main stream. California has set a goal to create 3,000 megawatts of new, solar-produced electricity by 2017 - moving the state toward a cleaner energy future and helping lower the cost of solar systems for consumers. The California Solar Initiative provides incentives for existing homes, and existing and new commercial, industrial and agricultural properties. The Solar Water Heating Pilot Program is part of the California Solar Initiative that provides incentives to

businesses and residential customers who install qualifying solar water heating systems. Currently, only San Diego Gas and Electric customers are eligible for the Solar Water Heating Pilot Program, whose coordinators expect it to grow into a statewide program.

Going solar is not only the socially responsible thing to do, it's also financially sound. "Look at the expectation. Energy rates are no different than anything else in this world, whether it's gasoline or food or clothes. Your energy bill is going to increase," says Executive Director of the California Center for Sustainable Energy, Irene Stillings, "If you put in solar power, you can cut down on your ener gy bill. You can cut off the most expensive kilowatt-hours by installing solar power. If you do that, it becomes very cost-effective." Some peo-

ple even manage to zero-out their energy bill after installing PV systems - paying nothing to the electric company. Your electricity meter may actually spin backwards, in which case the electric company will credit your account at the retail rate.

Solar thermal systems yield similar results for the homeowner. "These systems address the portion of natural gas consumption that's used to heat water explains Program Manager of the Solar Water Healing Pilot Program, Annie Henderson. "We can normally lower that bill by 50 percent or more. One of the benefits of solar water heating is that the initial cost is low Coupled with PV, it is a great way to address both your

electric and your natural gas consumption in the home."

The benefits from installing home solar energy sys-

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Materials and Resources

- CCSE Web portal: <u>www.energycenter.org.</u>
- Potential studies, regional planning research
- Legislative research support
- Training materials and curricula
- Demo Systems, Case Studies, Best Practices, Testimonials
- E-Newsletter (~6,000 and growing)
- Events Calendar



Outreach Channels

- Events: conventions, home shows, etc.
- Direct Mail (where mandated)
- ERC an established education center and training platform
- Cable TV & radio spots always with large earned component
- Internet tie-ins with traditional media
- Sponsorships and in-kind support
 - ASES 2008; Solar Power 2008



Partners in Policy, Outreach and Implementation

- Local and State elected officials, staffs
- Municipalities, County, SANDAG
- SDG&E and other utilities
- Contractors, manufacturers, industry stakeholders, trades
- Code bodies and inspector associations
- Fire Districts, Community groups
- Advocacy organizations (CalSEIA, League of Women Voters, Environment California, etc.)



Collaboration is Key

"I not only use all of the brains I have, but all I can borrow"

-Woodrow Wilson, 28th President of the United States



